Allegiance Telecom Synopsis (continued)

Although Allegiance may buy ILEC loop UNEs, it did not do so anywhere from GTE as of December 31, 1998.

Allegiance is noted for its implementation of electronic bonding with Bell Atlantic in New York (January 7, 1999): implementation of an electronic gateway linking the operations support systems (OSS) of the two companies:

Allegiance has acquired and is integrating back office systems to facilitate a smooth, efficient order management, provisioning, installation, trouble management, billing and collection, and customer service process. Allegiance has licensed and is using MetaSolv software for order management and customer provisioning, Lucent's ConnectVu for switch provisioning and Intertech for billing. 10Q report to the SEC; November 5, 1998.

The gateway permits Allegiance to create service requests online and monitor in real-time the entire provisioning and installation process. Allegiance expects the electronic bonding of its back office system with Bell Atlantic in New York to significantly reduce the amount of time from initial order entry to installation. Allegiance also expects to use the system as a basis to implement electronic bonding in other Bell Atlantic states as well as with other ILECs.

Concerning switching, at the end of March, 1999, Allegiance operated nine switches with plans to turn up additional ones with service initiation in new markets. As of March 1999, the company operated in Atlanta, Boston, Chicago, Dallas/Fort Worth, Los Angeles, New York, Oakland/San Jose/San Francisco, Philadelphia and Washington D.C. with plans to continue entering new markets at the rate of one per month through August 1999. And according to a press release dated April 21, 1999, "Allegiance completed the installation of its Houston switch in April, 1999, and is in the process of installing switches in Baltimore and San Diego, as well as second switches in Dallas and New York to expand capacity in these markets". According to Allegiance, as switches are brought on stream and collocations implemented, the proportion of circuits initially provisioned on Allegiance facilities continues to increase. For example, in the fourth quarter of 1998, 91% of the 43,100 lines sold were "on-switch" compared to 86% in the third quarter of 1998. Similarly, of the total lines installed in 1998, 64% were "on-switch" at the end of the fourth quarter, compared to a cumulative total of 47% at the end of the third quarter of 1998.

In the aggregate at the end of 1998, Allegiance claimed strong gains in its addressable market during the fourth quarter:

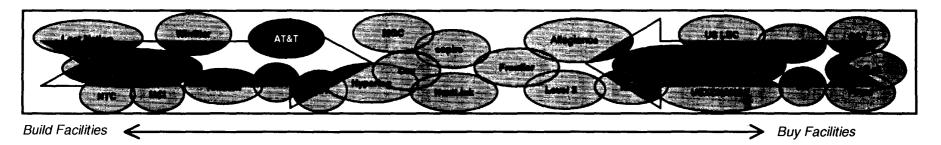
- Collocations in 101 central offices for unbundled loops with 159 additional collocations as "work-in-process"
- Access to four additional central offices for T1 hub service
- Addressable "on-switch" market of approximately 3.6 million local business access lines, an increase of 77% from the third quarter of 1998.

Finally, the Dallas-Fort Worth and Los Angeles areas appear to be typical of Allegiance's regional operations. Allegiance operates one Lucent 5ESS switch in each market. Allegiance also operates predominantly in the urban center of Dallas but offers services in the suburbs of Richardson and Addison. Additionally, Allegiance is offering service in Plano and Irving beginning in April 1999. Consistent with its network strategy, the company has not deployed any fiber in Dallas.

Allegiance Telecom Synopsis (continued)

	Dallas-Fort Worth and Los Angeles			
Facilities	 One class five switch in each market Lucent 5ESS Deployment of own OSS systems Lease of transport facilities, typically from 	non-ILEC alternati	talisis suote mathiaminen minki shidhindhi dhaliindhi miliiminintal mathiaminintal districti un amani shindi di VOS .	
Targeting	 Small and medium-sized business custom Government and institutional customers Offers local, long distance, internation transmission, and Internet services 		nced services, high-speed data	
Strategy	 "Smart-build" strategy: deploy switching a Aggressive facilities-based roll-out in 24 m Establish electronic bonding to emphasize company's image as cutting-edge provid apparently is effective in selling such basic 	najor metropolitan a e its highest capac der of private line	areas ity services in order to bolster the and broadband services. This	
Service Offerings	Local access (dial tone) Switched services including long distance Dedicated lines (data) Special access services Internet	Yes	No.	

AT&T Synopsis



AT&T predominantly serves local customers via its own network. As of December 31, 1998, AT&T purchased no UNE loops from GTE and resold only a handful of GTE's lines. In the Dallas-Fort Worth, Los Angeles, and Tampa areas, AT&T possesses at least one class five switch in each market. As detailed below, AT&T also has significant transport capacity in Dallas, Los Angeles, and Tampa. None of AT&T's existing or planned facilities for cable telephone are captured in this report. However, it is clear that AT&T is moving ahead to enter the local exchange market with the aid of cable networks acquired through acquisitions, including Telecommunications, Inc. (TCI) and MediaOne. In early May, 1999, AT&T began offering local telephone service over TCI's cable television network to selected homes in Fremont, California, with plans to expand the phone-over cable trials to Seattle, Portland, Dallas, Salt Lake City, Denver, Chicago, St. Louis, and another to-be-determined city in the San Francisco Bay Area by the end of 1999.

AT&T has provided local service in the Dallas-Fort Worth Metroplex since mid-1996 (serving over 100 buildings) and competitive access services and data services since 1991. Although AT&T initially targeted customers in Southwestern Bell's territory, it has expanded into GTE's service area. Presently, AT&T has end-to-end offers for switched (DS-0) and dedicated (DS-1) access customers that include local, intraLATA, toll-free long distance, and international services. Customers receive a single bill and earn discounts based on total eligible bundled usage. AT&T also targets dedicated local and intraLATA-only service for businesses with heavy local calling patterns.

In terms of facilities, AT&T has two class five switches in Dallas, one Lucent 5ESS with DACS IV cross connects and DDM multiplexers and one Nortel DMS100 acquired along with TCG. AT&T's local transport capacity in the Metroplex

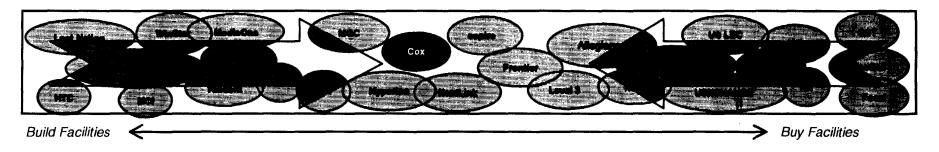
spans approximately 500 route miles, stretching from downtown Dallas to the suburbs located north and west of the city. Specifically, AT&T's extensive local network in the Metroplex runs through the central business district in downtown Dallas and extends into Irving and Las Colinas, northward to Carrollton, Addison, Richardson, and Plano, and also campuses the DFW airport and parts of Arlington, Garland, and Fort Worth.

Each of AT&T's fiber networks are of SONET ring architecture. Specifically, local AT&T technical professionals indicate that there are currently no fewer than ten self-healing SONET rings transmitting voice and data traffic in the Metroplex. Their network backbone runs at speeds up to OC48 (4 OC48 and 6 OC3), and AT&T Local has installed 12 nodes along the Dallas network. In the greater Tampa and Los Angeles areas, AT&T also has deployed extensive local facilities. AT&T operates SONET rings in both cities, and company representatives have indicated plans to expand fiber within Tampa, Clearwater, and Polk County. AT&T has one class five digital switch—a Lucent 5ESS—in each of Tampa and Los Angeles.

AT&T Synopsis (continued)

Zurztenschlage (198-19-29) zusteus (Christophilophilophilophilophilophilophilophil	Dallas-Fort Worth	Tampa	Los Angeles
Facilities	Two class five switches - Lucent 5ESS - DMS100	One class five switch - Lucent 5ESS	One class five switch - Lucent 5ESS
	SONET rings covering Addison, Arlington, Carrollton, Dallas, Garland, Fort Worth, Irving/Los Colinas, and Richardson.	SONET ring covering Clearwater, Sarasota, St. Petersburg, and Tampa.	SONET ring covering Anaheim, Gardena, Long Beach, Los Angeles, Oxnard, Santa Monica, San Bernadino, and Sherman Oaks.
Targeting	size businesses as well as lar	rge businesses with which AT& esent business customers to be	ICI, AT&T targets small and medium I has national accounts as an IXC. multi-carrier, using another provider for
Strategy	Internet services targeted for	local exchange carriers among ATV monopolies, wireline assets	RT has announced "private label" others. s of TCG, and fixed wireless technology.
Service Offerings (Dallas-Fort Worth, Tampa, Los Angeles)	Local access (dial tone) Switched services Dedicated lines (data) Special access services	The state of the s	ki interdentalan shunt en unterdentalan kuntu sake was kinganak halan maka inganar-saku. Pata unterdentalan kunu No

Cox Communications Synopsis



Cox Communications is the fifth largest cable company in the United States, serving about 3.3 million subscribers with over five million homes passed in highly clustered network arrangements. In 1997, Cox Communications began offering digital telephony services to residential customers in apartment complexes and small businesses in Orange County, California, and Omaha, Nebraska. Cox continues selectively to expand and upgrade its broadband network to provide residential telephony services as part of a bundled service offering with its cable services. With cable-based telephony and deployment of its own class five switches, Cox is able to bypass ILEC networks in their entirety, and can avoid the need to acquire UNEs.

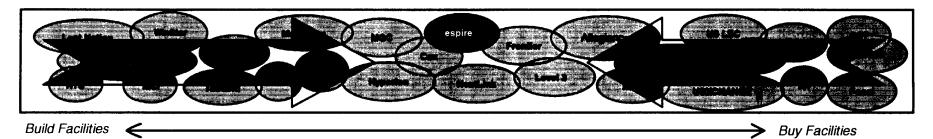
As of December 31, 1997, approximately 85% of Cox's customers were served by its nine largest clusters. These large, dense clusters allow the company to realize significant efficiencies through the consolidation of its marketing and support functions. Cox leverages this position efficiently to offer a full range of telecommunications services to its business and residential customers: local, long distance, video, and Internet access. Additionally, Cox offers the @Work and @Home Internet access services to small business and residential customers.

In the Los Angeles market profiled here, Cox has deployed one Lucent 5ESS switch. In GTE's Santa Barbara market, Cox has deployed 140 fiber route miles (6,000 fiber miles), 105 broadband nodes, and one Fore Systems ATM switch. In addition to local service, Cox offers data connectivity at speeds from T1 to 100 Mbps and transparent LAN operation to commercial customers in the area.

Cox Communications Synopsis (continued)

	Los A	ngeles	
Facilities	One class five switch Lucent 5ESS digital switch	ar ar an ann an Aireann ann an Ai	1900 - ur akaray a terdama, akarakan dibabah dibib di kacama mempunyai melinti (m. 1905) ada sa menjekan dibab
	Dense cluster of cable distribution network for	provision of cable	e-based telephony.
Targeting	 National strategy of focusing on small business and residential customers but will offer data services to medium-sized businesses Offers an integrated package of local, long-distance, cable, data, and Internet services Cox high-speed @Home and Cox @Work are Internet access services that bundled in ar attractively priced package to residential and small office customers. 		
Strategy	 Leverage its position as the cable provider in a selected market. Upgrades its network with broadband capability. 		
Service Offerings	the Michigan was the sign appropriate the Antonia and the anti-device and the state of the sign approximate state of the second state of the sign approximate state of the second state of	Yes	No
	Local access (dial tone)	✓	
	Switched services including long distance	✓	
	Dedicated lines (data)	✓	
	Internet	✓	

e.spire Synopsis



As a facilities-based carrier, e.spire targets business customers in 35 markets, primarily in the south and southeast Unites States. The company provides dedicated, local, and long distance voice services as well as frame relay, ATM, and Internet services. With a minimal reliance on ILEC UNEs and service resale, e.spire's facilities-based network is designed to serve customers on an end-to-end basis. As of December 31, 1998, e.spire's network was comprised of 1,742 route miles of fiber in its 35 local networks in 21 states, 66 Newbridge ATM switches, 19 Lucent 5ESS switches and approximately 22,000 backbone long-haul miles in its leased coast-to-coast broadband data network.

Entering the Dallas-Fort Worth Metroplex in 1994, e.spire provided competitive access services in Fort Worth. In 1996, e.spire began pursuing its strategy to provide local switched services and aggressively built its network in the area. The company's network in the Metroplex now encompasses 230 route miles of fiber and three Lucent 5ESS switches. Since then, e.spire has focused on adding buildings to the network and marketing its existing capabilities. E.spire's network in Dallas includes one OC-48 SONET ring in Dallas, another OC-48 SONET ring in Fort Worth, and a third OC-48 SONET ring that runs through the Irving/Los Colinas suburbs of Dallas and connects the first two.

e.spire Synopsis (continued)

In Tampa, e.spire also has deployed a Lucent 5ESS switch and a self-healing fiber optic SONET ring that serves the central business district downtown and surrounding area. Expansion plans of 32 miles were implemented in 1997: (1) an expansion westward from downtown to the business district near Westshore and Cypress; and, (2) an expansion from downtown eastward to business parks in Sable Park and Temple Terrace.

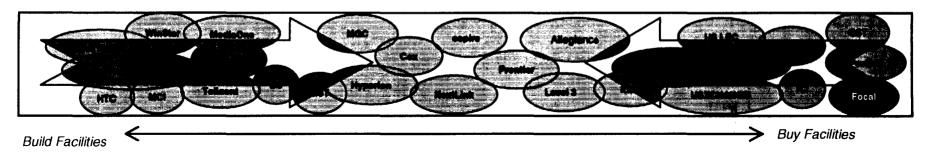
In addition to deploying facilities aggressively, e.spire has used acquisitions and alliances to increase its customer base and leverage marketing opportunities. For example, e.spire acquired ISP Cybergate in the first quarter of 1997 in an equity transaction, and it acquired ISP ICANECT's subscriber base in the third quarter of 1998 in a cash and equity deal. Furthermore, in August 1998, e.spire established a long-term lease arrangement with Metromedia Fiber Network to expand its local networks in New York and Philadelphia and to establish a long-haul network route from New York to Baltimore. E.spire also has an agreement for long-term access to a 432-strand fiber optic cable in Hyperion's south Florida network; at the same time, e.spire will provide Hyperion with network construction and professional services worth \$30 million over the next four years. E.spire is primarily a facilities-based competitor, but it has also acquired UNEs and does utilize ILEC service resale. For example, in Tampa, e.spire has purchased 14 UNEs and has 2,940 resale lines.

One of the vertical dimensions along which e.spire competes is through the local calling scope. The company's bundled service offering, Platinum Service, has flat-rate pricing for local calls with no additional charge for the most enhanced features. In specific areas, however, the flat rate extends to areas that would generate toll charges with other carriers. For example, "Corridor Calling" service allows calling throughout the Washington-Baltimore markets at the price of a local call. Similarly, in Lexington, Kentucky, e.spire offers a four-county calling scope.

e.spire Synopsis (continued)

	Dallas-Fort Worth	Lexington, KY	Tampa		
Facilities	Three class five switches Three Lucent 5ESS	Co-location in Lexington	One class five switch Lucent 5ESS		
	Three OC48 SONET rings covering Dallas, Fort Worth, and Irving/Los Colinas.		SONET rings covering downtown, Westshore, and Temple Terrace.		
Targeting	Medium to large-sized busines		and the second and th		
	 Institutional customers and government 	vernment offices			
	 Offers dedicated, local, and lor 	ng distance voice services (dom	estic and international) as well as		
	frame relay, ATM, and Internet	services.			
	Flat-rate pricing for local calls to the second call calls to the second call calls to the second calls to the second calls to the second call call calls to the second call cal	with no additional charge for the	most popular custom calling features		
	is available				
	Prepackaged and custom data	solutions			
Strategy	 Prepackaged and custom data Strategy to expand network via 	n 1970 kalkum kadanna (1800 c. 1845 kalakun 1860 c. 1800 computen c. 1881 sendan dendarah kalakul kecaman mesiki dan	uusudun kii 11 muutustali vuo muussid vadakinnissassa kikhinni koosid siissi vasti kii va ensi hiissa, siissa siissa		
Strategy	Strategy to expand network via	n 1970 kalkum kadanna (1800 c. 1845 kalakun 1860 c. 1800 computen c. 1881 sendan dendarah kalakul kecaman mesiki dan			
Strategy	Strategy to expand network viaOwn and operate high-capacity	a construction and acquisition y networks with broad market co	overage broader than those offered by ILEC		
nicanis contrava (10 cm orillatures secured antificients suomat (10 debendari	Strategy to expand network viaOwn and operate high-capacity	a construction and acquisition y networks with broad market co	•		
nicada e "rifa e "sal De de selektiones completentes laborates (selektiones).	Strategy to expand network viaOwn and operate high-capacity	a construction and acquisition y networks with broad market co ng expanded local calling areas	broader than those offered by ILEC		
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onicado, misiores Desile militares accumental del Marconsis in incissa de l'información	 Strategy to expand network via Own and operate high-capacity Non-traditional pricing, includir Local access (dial tone) Enhanced services Switched services 	a construction and acquisition y networks with broad market co ng expanded local calling areas	broader than those offered by ILEC		
Strategy Service Offerings	 Strategy to expand network via Own and operate high-capacity Non-traditional pricing, including Local access (dial tone) Enhanced services Switched services Dedicated lines (data) 	a construction and acquisition y networks with broad market co ng expanded local calling areas	broader than those offered by ILEC		

Focal Communications Synopsis



Focal is a new breed of facilities-based carrier, the very existence of which evidences the viability of existing wholesale markets for network elements in urban areas. Unlike carriers that try to address all the telecommunications needs of their customers with bundled offers, Focal provides local dial tone almost exclusively. Focal offers local telecommunications services to corporate users, Internet Service Providers (ISPs), and value-added resellers. The vertical dimensions of quality and customer service are Focal's key sources of differentiation. It appears to be working: since its establishment in 1996, Focal has experienced zero customer churn.

With several CLECs now providing service in most major metropolitan areas, Focal strategically locates switches in markets with large concentrations of fiber optic networks. Focal then reaches its customers by leasing transport lines to the customer or by building the lines itself as economically justified. Either way, market alternatives are available for transport:

The company believes it can lower its initial capital requirements and generate a substantially greater return on invested capital by concentrating its investments in switching and information, billing, and support systems, while leasing transport facilities. The company has to date been successful in negotiating lease agreements which match the duration of its customer contracts, thereby allowing the company to avoid the risk of continuing expenses associated with transmission facilities that are not being used by revenue generating customers. Focal 10Q report to the SEC, November 1998.

Focal Communications Synopsis (continued)

In addition to procuring transport capacity at market, Focal also secures loops from any number of sources. In an interview in 1997¹, Focal CEO Robert C. Taylor, Jr. described Focal's loop strategy as follows:

A typical [Focal] customer will have a PBX and will need a connection from his PBX to our switch. We will go, depending upon where his location is, and essentially get a facility that connects him to us for that initial loop connection. It can be anything from the unbundled ILEC loop to a CLEC loop to a Focal-provided loop.

When asked how cooperative CLECs have been in making loop arrangements with them, Taylor continued:

Very. In some instances you could say we're buying the dumb pipes and adding the intelligence behind that. So, from a CLEC perspective, and even from an RBOC perspective, they have business units that sell dumb pipes, that sell SONET rings, and that sell construction facilities for building these things.

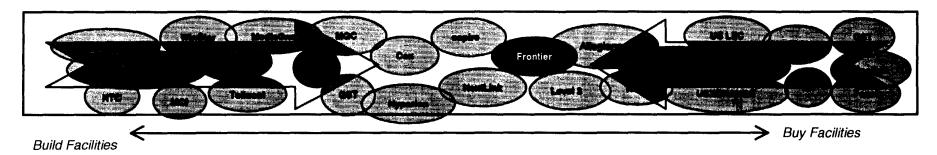
Switch deployment and procurement of other network elements is consistent with Focal's presence in the greater Los Angeles area. Specifically, Focal operates its own Nortel DMS500 switching system. Although Focal purchased no UNEs from GTE as of December 31, 1998, its service area is focused primarily within PacBell's franchised area.

¹ "Focal CEO Questions Bundling Philosophy, Focuses on Dial Tone for Big Businesses." *Telco Competition Report.* December 4, 1997.

Focal Communications Synopsis (continued)

	Los Angeles			
Facilities	One class five switch Nortel DMS500 Local switched services for business, institutional, and government customers, Internet Service Providers (ISPs) and value-added resellers. Telecommunications-intensive users in large metropolitan markets that demand highly reliable, local switched services.			
Targeting				
, declarate described communication of communication of the communicatio	 Deploy switches strategically in areas with high concentrations of telecommunications-intensive users and where other CLECs alre so as to purchase transport capacity at market rates. Views the ILEC as its prime competitor in each market. Market niche is for diversity and reliability in local service. 			
Service Offerings	tengsalvassavada saturatura vastindade santa india atta kan kananteliseen kanantelisee	de accesso pergradoria continuada de describir o el control de control control del del del del del Yes	and an experimental control of the c	
·	Local access (dial tone)	✓		
	Switched services	✓		
	Dedicated lines (data)		✓	
	Special services (HiCAP, ATM, ADSL)		✓	
	Internet		✓	
	CATV		✓	

Frontier Synopsis



Formerly named Rochester Telephone Corporation, Frontier Corporation is an ILEC in several areas and has affiliates in cellular, network services, and information systems. Overall, Frontier ranks as the twelfth largest local exchange provider, the fifth largest long distance provider, and the ninth largest interconnect company in the nation. Frontier operates its own facilities in 13 metropolitan areas, and it resells local service in 32 states and the District of Columbia. Frontier's stated plans, however, had been to expand its CLEC facilities-based coverage to 25 metropolitan areas on-net by March 1999. Frontier's initiative is to build a "next-generation" nationwide network that connects 120 major cities coast-to-coast via 20,000 route miles of fiber in a self-healing SONET architecture; this network will provide high-speed, high-capacity broadband voice and data capabilities. As of March, 1999, approximately 65% of the Optronics network is carrying traffic.

The company provides local telephone service as a facilities-based CLEC nationwide, with 34 telephone operating subsidiaries in 13 states, and served approximately 200,000 access lines in 1998, double its 1997 total. Frontier offers a comprehensive set of telecommunications services on both a wholesale and retail basis: local, long distance, wireless, data, and advanced services. The company also sells equipment and installation, billing and reporting, and operator services. Frontier primarily targets small and medium-sized businesses, defined as billing between \$3,000 and \$50,000 per month. By integrating ILEC service resale and facilities-based provision, Frontier claims to be able to address about 70% of all business locations nationwide.

Frontier Synopsis (continued)

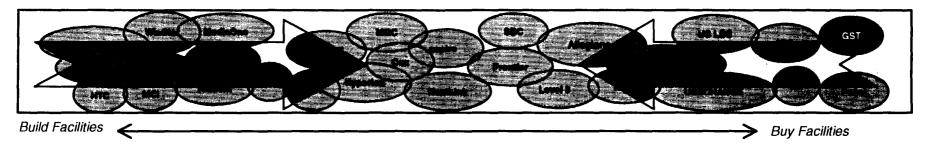
As of March, 1999, Frontier has expanded its coverage to 32 states plus Washington, DC for local resale and to 22 top business markets for other facilities-based local service, cumulatively reaching 70% of the US business population.

In the Dallas-Fort Worth Metroplex and Los Angeles, Frontier operates a total of two Nortel DMS500 switches. No additional details of Frontier's network configuration in these markets were available, but Frontier purchased no UNEs or resold services from GTE in these areas as of December 31, 1998.

Frontier Synopsis (continued)

	Los Angeles	Dallas-Fort Worth		
Facilities	One class five switch	One class five switch	, in a sun in equipment in an experimental and the latest that the state of the sun indicates a subsect of the sun indicates and the sun indicates a subsect of the su	
	Nortel DMS500	Nortel DMS500		
Targeting	Small and medium-sized businesses, defined as billing between \$3,000 and \$50,000 per month			
	 Integrated, high value users with demand for bundled, integrated telecommunications 			
	 Offers local, long distance, wireless, data, and advanced services as both a retail and wholesale provider. 			
	Sells equipment and installation, billing and reporting, and operator services			
Strategy	Initial entry via ILEC service resale with migration of customers onto Frontier's own network.			
	Leverage nationwide presence and scale			
	 Extensive use of sales agent 	relationships and other retail pa	rtnerships	
Service Offerings	alisar (ir n. etc.) etc.). Eist, sa seeklasiskalt opsig intlinik ansamieklikiekseliskalt elikelestasiselten er adistasisiselten erasiseltesiselten er e. e.	- 1 - Colombia de Calamanda (Labarda), de facarda action de anterior de la colombia del la colombia de la colombia del la colombia de la colombia de la colombia del la colomb	in the state of the second sec	
•	Local access (dial tone)	√		
	Switched services	✓		
	Dedicated lines (data)	✓		
	Special access services	✓		
	Internet	✓		
	Wireless	✓		

GST Synopsis



GST Telecommunications is a full-service competitive provider of integrated telecommunications products and services in 42 cities, primarily in the western continental United States and Hawaii. GST serves customers through a mix of service resale and facilities-based provision. As of the third quarter of 1998, GST owned and operated 14 class five switches, five ATM switches, and 22 frame relay switches among the markets it serves. Furthermore, GST owns an extensive network with over 120K fiber miles; it also leases 27K fiber miles and is in the process of constructing over 77K additional fiber miles. GST also is an aggressive wholesaler. In a candid response for this research, a GST representative stated that the company will resell its own and even leased capacity to "everybody in the Los Angeles market in every shape the customer asks for it." This willingness to wholesale capacity demonstrates that wholesale marketets are developing.

As a full-service provider, GST serves business customers, interexchange carriers, and government entities, primarily in markets with a population of 250,000 to 2 million people. GST mainly targets small and medium-size businesses with 12 to 15 lines but acquired several long distance resellers in 1997 and 1998 to expand its customer base and push its local, data, and Internet services:

Company Acquired	Segment Date		Transaction Notes
Whole Earth Network	SP	3Q98	\$9 million cash
CallAmerica Phoenix	IXC	1Q98	Stock transaction
ICON Communications	CLEC/IXC	1Q98	\$23.8 million cash
Action Telecom	CAP/IXC	2Q97	\$12.1 million cash and stock
CallAmerica Bus. Com.	IXC	1Q97	\$17 million stock

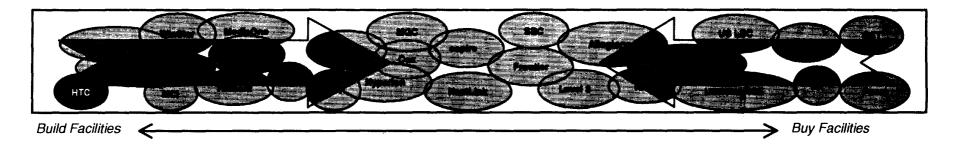
GST Synopsis (continued)

GST's expansion through Los Angeles is part of the company's general entry into southern California markets and linkage throughout the northwest United States. According to the Local Exchange Routing Guide, GST operates seven distinct class five switches in the greater Los Angeles area: two Nortel DMS10s, one DMS100, two DMS250s and two Northern Electric DSSI GST also is adding SONET rings incrementally as its regional customer base grows and tends to focus on areas like Riverside, San Bernardino, Santa Barbara, and Palm Springs. Furthermore, GST is expanding its long-haul transport capacity with planned construction of fiber to connect Santa Barbara, Santa Luis Obispo, and Fresno, with its SONET rings in Oregon and Washington, and as far south as San Diego, California. Specifically, in January 1999, GST Telecommunications formed alliances to extend its existing Los Angeles-to-Sacramento fiber backbone to Portland, Oregon. GST is cooperating with Pacific Fiber Link and Williams Communications to build a 715-mile backbone network in a \$47.2 million agreement that will split the cost among all participants. Additionally, in October 1998, GST and FTV Communications agreed to swap some of GST's fiber through California for fiber on FTV's network, which extends from Portland to Boise, Salt Lake City, Las Vegas, and Los Angeles.

GST Synopsis (continued)

	Dallas/Ft Worth	Los Angeles	
Facilities	One class five digital switch Manufacturer not indicated	Seven class five switches Two Northern Telecom DMS 10s One Northern Telecom DMS 100 Two Northern Telecom DMS 250s Two Northern Electric DSS Sonet Rings	
Targeting	 "At this time, we are not interested in to connect residential customers <u>yet</u>." GST customers mostly have more that 	with an average customer size of 12 to 15 lines. residential customers. It is not cost effective for a [Emphasis added] an one carrier; GST looks to secure a piece of the customer] to a more comprehensive package."	
Strategy	 Aggressively pursues wholesale efforts, stating it will resell its own and even leased capacity to "everybody in the Los Angeles market in every shape the customer asks for it." States a corporate objective to grow "in excess of 50 percent to 100 percent a year." Views incumbents (GTE, PacBell) as primary competition when wholesaling its capacity. 		
Service Offerings	Local access (dial tone) Switched services Dedicated lines (data Special services (HiCAP, ATM, ADSL) Internet	The content of the first paper is a content of the	

Horry Telephone Cooperative/HTC Communications, Inc. Synopsis



Horry Telephone Cooperative (HTC Communications as a CLEC) is the largest rural cooperative in the country. Net operating revenues reported for 1996 were \$33 million, with net plant of \$77 million and 317 employees (1996 USDA Statistical Report Rural Telecommunications Borrowers). Although it is small relative to GTE, the RBOCs, and other major industry players, its actions as a CLEC are as aggressive as any local competitive forays in the United States.

This research highlights competitive activity in Horry and Georgetown counties of South Carolina, which include the communities of Myrtle Beach, Pawley's Island, Georgetown, and Conway. HTC has built over GTE's local network with fiber in the Conway exchange and is offering a full range of voice and data services to residential and business customers. HTC also is constructing a local fiber network throughout GTE's Myrtle Beach exchange. HTC offers CATV service in much of its franchised local telephone service area and also appears to be preparing to compete with Time Warner in the CATV and high-speed Internet access markets throughout the more densely populated areas of both counties.

The targeted GTE exchanges are contiguous with Horry's ILEC exchanges; this enables HTC to set up a demarcation point near its ILEC exchange boundary and then apparently lease connecting facilities between its deregulated entity (HTC) and its regulated entity (Horry Coop.). Extensive FTTC (fiber-to-the-curb) deployment then permits HTC to acquire GTE customers without obtaining any loop or other facilities from GTE. Except for one switch collocated with GTE in Myrtle Beach, basic local service is believed to be provided by transporting traffic to switches in Horry's ILEC territory, completely bypassing GTE. The deployment strategy leverages the assets of the cooperative and evidences that Horry has excess switching capacity.

Furthermore, the City of Georgetown's Electric Power Department is building a fiber network that will connect approximately 50 municipal locations and appears to have significant excess capacity. Construction of this network is being performed by HTC as the city's general contractor. Additionally, HTC has a ten year contract with the city to manage the system, including marketing of voice, data, and CATV services to the business and residential markets. The network is expected to become operational in July 1999.

In addition to the duplication of GTE's local networks in Conway, Myrtle Beach, and Georgetown, HTC has deployed extensive fiber routes that connect these areas as well as the Portraits Public Utility District, comprehensive coverage over two counties. Furthermore, HTC leases some transport capacity to other carriers in Myrtle Beach, including GTE. Specifically, GTE leases the fiber to complete a SONET ring and provide diversity to its switches in the Myrtle Beach area.

All Horry and HTC services are digital; this has been made possible in part by federal support from Rural Utilities Service (RUS). The RUS is the federal agency that provides rural infrastructure assistance for electricity, water, and telecommunications under the auspices of the United States Department of Agriculture (USDA). RUS regulations specify use of loan funds for "rural telecommunications infrastructure," but allow loans to be used for non-rural facilities in some cases. In addition to loans provided through the Rural Telephone Bank (RTB) at rates as low as 5%, the market rate

loans that cooperatives secure from private lenders are federally guaranteed, thereby affording a source of capital that might otherwise be unavailable to a for-profit competitor.

	Myrtle Beach MSA (Including Conway, Myrtle Beach, and Pawley's Island) Georgetown, SC
Facilities	 Extensive duplication of GTE's distribution network with fiber to the curb in Conway and Myrtle Beach. Extensive fiber distribution networks under construction in Myrtle Beach and Georgetown. Has deployed fiber transport facilities throughout the entire Grand Strand in South Carolina and leases capacity to other carriers, including GTE. HTC Comm. operates as a CLEC with three Siemens remotes. Switching is procured from Horry Telephone Cooperative.
Targeting	 Target: residential and small to mid-sized businesses in South Carolina markets contiguous to Horry's ILEC territories. Residential customer targets have been households that will purchase service packages that which include vertical services, long distance, internet access, and CATV in addition to basic local service (customers GTE would classify as "high value"). Special emphasis on new subdivisions: paying developers to grant HTC exclusive contracts. Business customer targets are largely mid-sized concerns such as medical, light manufacturing, retail and other commercial developments (whereby numerous customers can be captured).
Strategy	 Leverage local presence/"personal touch" combined with vertically integrated product offerings For residential, a below-market price point, including a waiver of all connection fees in Conway. Appears to be poised to compete with Time Warner in the CATV and high-speed Internet access markets.

Service Offerings	ukkana, kita sistekian nina mendan nina dan mendan kenasa sasti kata arajib (1. 1650) di urkan merikan nyawan dan dibuna dan di 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1.	Yes	No.
•	Local access (dial tone)	✓	
	Switched services	✓	
	Dedicated lines (data)	✓	
	Special services (HiCAP, ATM, ADSL)	✓	
	Internet	✓	
	CATV	✓	